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Amendments to the Claims

This listing of claims will replace all prior versions and listings of claims in the application:

1. (Previously presented) A device for kinetically controlling the rate of vapor diffusion during crystal growth said device having a first end, a second end, and a discrete diffusion pathway extending from the first end to the second end, wherein said pathway controls the vapor diffusion rate between a crystal growth solution and a reservoir solution, the first end of the device configured for placement in a well of a plate containing the reservoir solution.

2. (previously presented) The device of claim 1 wherein the diffusion pathways of the device are discrete channels.

3. (cancelled)

4. (previously presented) The device of claim 2 wherein channel size or geometry can be actively controlled.

5. (Previously presented) The device of claim 1 wherein the device is made of a material porous to a vapor moving between the crystal growth solution and the reservoir solution, the material provided to affect vapor diffusion rates.

6-13. (cancelled)

14. (previously presented) A device for kinetically controlling the rate of vapor diffusion during crystal growth in a crystal growth solution comprising:

(a) a reservoir unit comprising a plurality of reservoir chambers.

(b) a channel unit comprising a plurality of discrete channels configured to control the rate of vapor diffusion between the reservoir chamber and the crystal growth solution, each of the channels having a geometry different from each other channel to provide a different diffusion rate; and

(c) a selection unit comprising an opening wherein the opening is large enough not to control the rate of vapor diffusion between the reservoir chamber and the crystal growth solution;

wherein the channel unit and the selection unit rotate individually to align the reservoir chamber, one of the discrete channels, and the opening.

15. (previously presented) The device of claim 14 further comprising a cover for sealing the crystal growth solution in a space adjacent the selection unit, the space in vapor communication with the selection unit.